

INTERNATIONAL SEARCH REPORT

International application No

PCT/US2007/084884

A. CLASSIFICATION OF SUBJECT MATTER

INV. E21B33/035 E21B33/038 E21B43/36

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

E21B

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 03/078793 A (ABB OFFSHORE SYSTEMS AS [NO]; OESTERGAARD INGE [NO]) 25 September 2003 (2003-09-25) page 3, line 4 - line 12; figures 1-3,22 page 3, line 21 - line 28 page 5, line 21 - line 24 page 10, line 21 - line 27 page 11, line 28 - line 31 page 18, line 26 - line 32	1-10, 22-25
X	WO 2005/083228 A (ENHANCED RECOVERY LTD DES [GB]; DONALD IAN [GB]; REID JOHN [GB]; CRAWF) 9 September 2005 (2005-09-09) claims 1,24,25,28,30,31; figures 4-10,14,16	1-25

☒ Further documents are listed in the continuation of Box C.☒ See patent family annex.

* Special categories of cited documents :

- *A* document defining the general state of the art which is not considered to be of particular relevance
- *E* earlier document but published on or after the international filing date
- *L* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- *O* document referring to an oral disclosure, use, exhibition or other means
- *P* document published prior to the international filing date but later than the priority date claimed

- *T* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- *X* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- *Y* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.
- *Z* document member of the same patent family

Date of the actual completion of the international search

6 June 2008

Date of mailing of the international search report

13/06/2008

Name and mailing address of the ISA/

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INTERNATIONAL SEARCH REPORT

International application No

PCT/US2007/084884

C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 03/033868 A (ALPHA THAMES LTD [GB]; APPLEFORD DAVID ERIC [GB]; LANE BRIAN WILLIAM []) 24 April 2003 (2003-04-24) claims 1,4,5; figures 1,2,4 -----	1-8, 22-25
X	WO 00/47864 A (FMC CORP [US]; ANDERSEN TORE [NO]; BREDÅ JOEREN [NO]; GATHERAR NICHOLA) 17 August 2000 (2000-08-17) page 4, line 6 - line 24 page 5, line 29 - page 6, line 9 page 13, line 23 - line 31; figures 3,4 figures 25-35 -----	1-10, 22-25
A	WO 2005/047646 A (ENHANCED RECOVERY LTD DES [GB]; DONALD IAN [GB]; REID JOHN [GB]) 26 May 2005 (2005-05-26) cited in the application abstract -----	12,18

INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No

PCT/US2007/084884

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
WO 03078793	A	25-09-2003	AU 2003206458 A1	29-09-2003
			GB 2402687 A	15-12-2004
			NO 20020989 A	29-08-2003
			US 2005173322 A1	11-08-2005
WO 2005083228	A	09-09-2005	AU 2005216412 A1	09-09-2005
			BR PI0508049 A	17-07-2007
			CA 2555403 A1	09-09-2005
			EP 1721058 A1	15-11-2006
WO 03033868	A	24-04-2003	AT 326611 T	15-06-2006
			BR 0213625 A	14-09-2004
			EP 1444415 A1	11-08-2004
			NO 20041929 A	11-05-2004
			US 2004251030 A1	16-12-2004
WO 0047864	A	17-08-2000	AU 2453300 A	29-08-2000
			BR 0009965 A	26-03-2002
			CA 2362810 A1	17-08-2000
			EP 1151178 A1	07-11-2001
WO 2005047646	A	26-05-2005	AU 2004289864 A1	26-05-2005
			CA 2526714 A1	26-05-2005

PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY

PCT

To:

see form PCT/ISA/220

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY (PCT Rule 43bis.1)

Date of mailing
(day/month/year) see form PCT/ISA/210 (second sheet)

Applicant's or agent's file reference
see form PCT/ISA/220

FOR FURTHER ACTION
See paragraph 2 below

International application No.
PCT/US2007/084884

International filing date (day/month/year)
15.11.2007

Priority date (day/month/year)
18.12.2006

International Patent Classification (IPC) or both national classification and IPC
INV. E21B33/035 E21B33/038 E21B43/36

Applicant
CAMERON INTERNATIONAL CORPORATION

1. This opinion contains indications relating to the following items:

- ☒ Box No. I Basis of the opinion
- ☐ Box No. II Priority
- ☐ Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- ☐ Box No. IV Lack of unity of invention
- ☒ Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- ☐ Box No. VI Certain documents cited
- ☐ Box No. VII Certain defects in the international application
- ☐ Box No. VIII Certain observations on the international application

2. **FURTHER ACTION**

If a demand for international preliminary examination is made, this opinion will usually be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1bis(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

3. For further details, see notes to Form PCT/ISA/220.

Name and mailing address of the ISA:



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Date of completion of
this opinion

see form
PCT/ISA/210

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**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.
PCT/US2007/084884

Box No. I Basis of the opinion

1. With regard to the **language**, this opinion has been established on the basis of:
 - ☒ the international application in the language in which it was filed
 - ☐ a translation of the international application into , which is the language of a translation furnished for the purposes of international search (Rules 12.3(a) and 23.1 (b)).
2. ☐ This opinion has been established taking into account the **rectification of an obvious mistake** authorized by or notified to this Authority under Rule 91 (Rule 43bis.1(a))
3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:
 - a. type of material:
 - ☐ a sequence listing
 - ☐ table(s) related to the sequence listing
 - b. format of material:
 - ☐ on paper
 - ☐ in electronic form
 - c. time of filing/furnishing:
 - ☐ contained in the international application as filed.
 - ☐ filed together with the international application in electronic form.
 - ☐ furnished subsequently to this Authority for the purposes of search.
4. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.
5. Additional comments:

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.
PCT/US2007/084884

Box No. V Reasoned statement under Rule 43*bis*.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. Statement

Novelty (N)	Yes: Claims	
	No: Claims	<u>1-25</u>
Inventive step (IS)	Yes: Claims	
	No: Claims	<u>1-25</u>
Industrial applicability (IA)	Yes: Claims	<u>1-25</u>
	No: Claims	

2. Citations and explanations

see separate sheet

Re Item V.

1 Reference is made to the following documents:

- D1: WO 03/078793 A (ABB OFFSHORE SYSTEMS AS [NO]; OESTERGAARD INGE [NO]) 25 September 2003
- D2: WO 2005/083228 A (ENHANCED RECOVERY LTD DES [GB]; DONALD IAN [GB]; REID JOHN [GB]; CRAWF) 9 September 2005
- D3: WO 03/033868 A (ALPHA THAMES LTD [GB]; APPLEFORD DAVID ERIC [GB]; LANE BRIAN WILLIAM [GB]) 24 April 2003
- D4: WO 00/47864 A (FMC CORP [US]; ANDERSEN TORE [NO]; BRED A JOEREN [NO]; GATHERER NICHOLA) 17 August 2000
- D5: WO 2005/047646 A (ENHANCED RECOVERY LTD DES [GB]; DONALD IAN [GB]; REID JOHN [GB]) 26 May 2005 cited in the application

2 INDEPENDENT CLAIM 1

- 2.1 The present application does not meet the criteria of Article 33(1) PCT, because the subject-matter of claim 1 is not new in the sense of Article 33(2) PCT.

Document D1 discloses (the references in parentheses applying to this document):

A system, comprising:

a first module (3) configured to process fluid from a well, wherein the first module comprises:

an extension conduit having a connection that is coupleable to a central mandrel of a manifold; (see figure 1)

a processing device (3a) arranged in a region surrounding the extension conduit;

a processing input; and

a processing output (see figure 22).

- 2.2 Documents D2-D4 also disclose all technical features of claim 1.

3 **DEPENDENT CLAIMS 2-11, 13-17, 19-21, 23, 25**

Dependent claims 2-11, 13-17, 19-21, 23, 25 do not contain any features which, in combination with the features of any claim to which they refer, meet the requirements of the PCT in respect of novelty and/or inventive step (Article 33(2) and (3) PCT), see the documents D1-D5 and the corresponding passages cited in the ISR.

- 4** The various definitions of the subject-matter given in the plurality of independent claims, namely 1,12,18,22 and 24, each reciting a different combination of limitations expressed at different levels of generalizations and largely repetitive, are such that the claims as a whole are not clear and concise. The requirements of Article 6 PCT, therefore, are not met.